



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/848,940	05/04/2001	Todd W. Herrick	C-472/TEC1154	8491
832	7590	08/02/2004	EXAMINER	
BAKER & DANIELS 111 E. WAYNE STREET SUITE 800 FORT WAYNE, IN 46802			ABRAMS, NEIL	
			ART UNIT	PAPER NUMBER
			2839	

DATE MAILED: 08/02/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	09/848,940	HERRICK	
	Examiner	Art Unit	
	Neil Abrams	2839	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 28 June 2004.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1,2 and 4-27 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 1,2 and 4-15 is/are allowed.
- 6) ☒ Claim(s) 16-24,26 and 27 is/are rejected.
- 7) ☒ Claim(s) 25 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|-----------------------------------------------------------------------------------------|-----------------------------------------------------------------------------|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

Claims 18-20 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

In each of claims 10, 20, steps of placing have no antecedent basis.

Claims 16-23, ^{24, 26}~~24-26~~ and 27 are rejected under 35 U.S.C. 103(a) as being unpatentable over Paterek in view of Mattis, Iizuka, Katoh, Onoda and Okabe.

Paterek and Iizuka are discussed in last office action. For claims 16, 21, Paterek fig. 2 does not include a free volume/cavity between 14 and layer 10 filled with a gel that is to cure into a solid state. Onoda at 140, Katoh at 19 and Mattis, col. 7, and figs. 8, 9 disclose materials, such as gels, sealants, to be placed between mating connectors. It would have been obvious to use such materials in Paterek to provide better sealing in the space adjacent layer 10. Also obvious to allow the material to "harden into a solid state" as taught by Onoda, col. 1, lines 58 and Okabe at 36. This would also serve to better seal the system. Also, note applicant's spec. page 14, lines 6, 7, in which it appears indicated that the "curing to solid form" is a matter of choice producing no stated advantage. Claims 17, 20, 22, 23, met by above combination.

For claim 21 "cluster block free volume" as broadly defined met by above combination and also by spaces 9 about wires 11. To fill spaces 9 with epoxy would be obvious in view of Okabe at 5. This change would provide sealing at the wires.

Claims 22, 23, 26, 27 met by references so applied. For claim 18, the front opening at 22 forms an aperture for filling the cluster block. For claim 24, openings 9 form free volume into which epoxy may be inserted. Note that claims 18, 19 do not

Art Unit: 2839

require placing dielectric into the Paterek space at 10 and would be met by dielectric filling at openings 9. Such step would be an obvious choice.

Claims 1, 2, 4-15 are allowed.

Claim 25 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

The following is an examiner's statement of reasons for allowance: For claims 1, 9, 25, these claims require ingress means for filling a cavity at the mating faces, after connectors are joined. See fig. 8. While Leitmann at P discloses use of such an ingress port for epoxy filling, that patent and Paterek are to connectors of entirely different function and structure and therefore Leitmann cannot properly be applied to suggest use of ingress port/epoxy fill for the Paterek device.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Applicant's arguments filed with the amendment and pertinent to claims now rejected have been fully considered but they are not persuasive. ***.

See above discussion.

For page 11, lines 20-22, argument is not understood; Onoda is seen to disclose sealing resin 140 used to fill a space between connector 100 and a mating connector.

Art Unit: 2839


THIS ACTION IS MADE FINAL. Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication should be directed to Neil Abrams at telephone number (571)272-2089.

Abrams/ds

07/27/04


NEIL ABRAMS
EXAMINER
ART UNIT 322